

What is claimed is:

1. A loop flushing circuit comprising:  
a variable displacement hydraulic pump;  
a hydraulic motor fluidly connected to the pump in a closed  
5 loop circuit by first and second system pressure lines;  
said hydraulic motor fluidly connected to the first and  
second system pressure lines;  
an electrically proportional control valve in at least one  
of the system pressure lines is fluidly connected to  
10 the hydraulic motor and adapted to regulate the  
flushing flow of the closed loop circuit, and  
a control means connected to the control valves in order to  
provide a loop flushing flow by activating only the  
control valve which is connected to a low pressure side  
15 of the loop flushing circuit.
2. The loop flushing circuit of claim 1 wherein the  
control means is a valve actuator.
- 20 3. The loop flushing circuit of claim 1 wherein the  
control means is an electrical actuator
4. The loop flushing circuit of claim 1 wherein the  
electrically proportional flow control valve is a spool  
25 valve.
5. The loop flushing circuit of claim 1 wherein the  
electrically proportional flow control valve is a poppet  
valve.
- 30 6. The loop flushing circuit of claim 1 wherein the  
control device actuates the electrically proportional flow

control valve based on operational parameters detected by the control device.

7. A loop flushing circuit comprising:  
5 a variable displacement hydraulic pump;  
a hydraulic motor fluidly connected to the pump in a closed  
loop circuit by first and second system pressure lines;  
said hydraulic motor fluidly connected to the first and  
second system pressure lines;  
10 a shuttle valve fluidly connected to the hydraulic motor;  
an electrically proportional control valve fluidly connected  
to the shuttle valve and adapted to regulate the  
flushing flow of the closed loop circuit, and  
a control means operably connected to the electrically  
15 proportional flow control valve adapted to open the  
electrically proportional flow control valve in a  
pressure line is below a threshold pressure.

8. The loop flushing circuit of claim 7 wherein the  
20 control means is a valve actuator.

9. The loop flushing circuit of claim 7 wherein the  
control means is an electrical actuator

25 10. The loop flushing circuit of claim 7 wherein the  
electrically proportional flow control valve is a spool  
valve.

11. The loop flushing circuit of claim 7 wherein the  
30 electrically proportional flow control valve is a poppet  
valve.

12. The loop flushing circuit of claim 7 wherein the control device actuates the electrically proportional flow control valve based on operational parameters detected by the control device.

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